AMENDMENTS TO THE CLAIMS

This listing of claims will replace all prior versions and listings of claims in the application:

LISTING OF CLAIMS:

1. (currently amended) A method of removing, as an unnecessary film, an unnecessary portion of a resist film formed as a coating film on a ~~surface of a substrate as a~~ substrate surface, comprising:

covering said substrate surface with a cover member having a top;

supplying a solvent from the top of said cover member through a supply hole formed at a predetermined position of said cover member; and

dissolving said unnecessary film by said solvent ;

the cover member defining a gap between an inner surface thereof and said substrate surface,

said substrate surface having an unprocessed region where said coating film is to be left as a necessary film and a processed region where said coating film is to be removed as said unnecessary film,

said gap in said unprocessed region having a size such that temperature distribution is not caused in said resist film under influence of heat transfer from said cover member,

said cover member being made of a material which hardly transfer heat such that exposure sensitivity of said resist film does not become nonuniform,

said cover member covering a substrate upper side at which said resist film is formed,

said material of said cover member being at least one selected from the group consisting of a resin material, a glass material, a ceramics material, and a composite material comprising a combination thereof, and

said solvent being supplied onto the top of said cover member and then supplied to said unnecessary portion through said supply hole at said predetermined position of said cover member.

2. (currently amended) A method of removing, as an unnecessary film, an unnecessary portion of a resist film formed as a coating film on a ~~surface of a substrate as a~~ substrate surface, comprising:

covering said substrate surface with a cover member having a top;

supplying said solvent from the top of said cover member through a supply hole formed at a predetermined position of said cover member; and

dissolving said unnecessary film by said solvent;

the cover member defining a gap between an inner surface thereof and said substrate surface,

said substrate surface having an unprocessed region where said coating film is to be left as a necessary film and a processed region where said coating film is to be removed as said unnecessary film,

said gap in said unprocessed region having a size such that temperature distribution is not caused in said resist film under influence of heat transfer from said cover member,

temperature distribution is not caused in said resist film formed on a principal surface of said substrate due to convection of gas produced in said gap, and

said cover member is made of a material which hardly transfer heat such that exposure sensitivity of said resist film does not become nonuniform,

said cover member covering a substrate upper side at which said resist film is formed,

said material of said cover member being at least one selected from the group consisting of a resin material, a glass material, a ceramics material, and a composite material comprising a combination thereof, and

said solvent being supplied onto the top of said cover member and then supplied to said unnecessary portion through said supply hole at said predetermined position of said cover member.

3. (original) A method as claimed in claim 1 or 2, wherein:

said gap has a constant or fixed size in said unprocessed region .

4. (previously presented) A method as claimed in claim 1 or 2, wherein:

said gap has a size selected so that said solvent supplied to said gap is allowed to pass through said gap and spread in said gap in said processed region.

5. (previously presented) A method as claimed in claim 1 or 2, wherein:

a string-like member having a predetermined thickness is interposed between the inner surface of said cover member and said substrate surface to serve as a gap defining member for

defining a size of said gap between the inner surface of said cover member and said substrate surface in said processed region.

6. (previously presented) A method as claimed in claim 1 or 2, wherein:

said unnecessary film is dissolved and removed by said solvent supplied through said supply hole while said substrate and said cover member are rotated together.

7. (previously presented) A method as claimed in claim 1 or 2, wherein:

said solvent is supplied from the top of said cover member and also supplied from a rear side of said substrate towards said processed region.

8. (currently amended): A device for removing, as an unnecessary film, an unnecessary portion of a resist film formed as a coating film on a ~~surface of a substrate as a~~ substrate surface by dissolving said unnecessary film with a solvent, comprising:

a cover member covering said substrate surface and having a top; and

a solvent supply unit for supplying said solvent from the top of said cover member;

the cover member having a supply hole through which said solvent from said solvent supply unit is supplied to said unnecessary film to thereby dissolve and remove said unnecessary film;

the cover member defining a gap between an inner surface thereof and said substrate surface,

said substrate surface having an unprocessed region where said coating film is to be left as a necessary film and a processed region where said coating film is to be removed as said unnecessary film,

said gap in said unprocessed region having a size such that temperature distribution is not caused in said resist film under influence of heat transfer from said cover member and that temperature distribution is not caused in said resist film due to convection of gas produced in said gap, and

said cover member is made of a material which hardly transfer heat such that exposure sensitivity of the resist film does not become nonuniform.

9. (original) A device as claimed in claim 8, wherein:

said gap has a constant or fixed size in said unprocessed region.

10. (original) A device as claimed in claim 8 or 9, wherein:

said gap has a size selected so that said solvent supplied to said gap is allowed to pass through said gap and spread in said gap in said processed region.

11. (currently amended): A method of manufacturing a photo mask blank, comprising:

depositing a film having a light shielding function and/or a phase shift function and a resist film on a light transmitting substrate, and

removing as an unnecessary film, an unnecessary portion of said resist film by the

method claimed in any one of claims 1 or 2 ~~through 7~~, the unnecessary film being formed in the deposition step.

12. (original) A method as claimed in claim 11, wherein:

the unnecessary film is formed on at least a surface peripheral region and a side surface region of the substrate, and

the unnecessary film is removed in said unnecessary film removing step.

13. (original) A method as claimed in claim 12, wherein:

the unnecessary film is formed on a back surface of the substrate, and

the unnecessary film is removed in said unnecessary film removing step.

14. (original) A method as claimed in claim 11, wherein:

the film having the light shielding function and/or the phase shift function is formed by sputtering or vapor deposition, and

the resist film is formed by coating.

15. (previously presented) A method as claimed in claim 1 or 2, wherein:

said material of said cover member is at least one selected from the group consisting of a resin material, a glass material, a ceramics material, and a composite material comprising a combination thereof.

16. (previously presented) A method as claimed in claim 4, wherein:

said cover member covers said substrate from an upper surface,

said cover member has a flat portion occupying a major part extending from a center towards an outer periphery,

a slant portion is formed such that said solvent flows from said flat portion towards said outer periphery,

a peripheral flat portion having solvent supply holes is formed from said slant portion towards said outer periphery, and

a side wall portion is extending downward from an outer peripheral edge of said peripheral flat portion in a direction substantially perpendicular thereto.

17. (previously presented) A method as claimed in claim 16 wherein;

said gap between said inner surface of said cover member and said substrate surface falls within a range between 0.05 mm and 3 mm in said processed region where said resist film is to be removed as said unnecessary film,

said gap between said inner surface of said cover member and said substrate surface falls within a range between 0.05 mm and 20.0 mm in said unprocessed region where said resist film is to be left as said necessary film, and

another gap between an inner surface of a side wall portion of said cover member and a side surface of said substrate has a size such that said so solvent passes through said gap in contact with said resist film.

18. (new) A method as claimed in claim 1 or 2, wherein:

said resist film is a resist film in an unbaked state.